

A New Species of the Genus *Dolichopus* Latreille, 1796 (Dolichopodidae: Diptera) from Pirin Mountain, Bulgaria

Oleg P. NEGROBOV¹

Mihail O. KECHEV²

¹Department of Ecology and Systematics of Invertebrate Animals, Biological-Soil Sciences Faculty, Voronezh State University, Universitetskaya pl. 1, Voronezh 394006, RUSSIA, e-mail: negrobov@list.ru

²Department of Agrotechnology, Higher School "Agricultural College", 78 Dunav Bld., Plovdiv 4003, BULGARIA, e-mail: mkechev@mail.bg

ABSTRACT

A new species *Dolichopus beschovskii* Negrobov & Kechev, spec.nov. is specified based on material collected nearby Okoto Lake from Pirin Mountain, Bulgaria. The new species is close to *Dolichopus socer* Loew, 1871.

Key words: Diptera, Dolichopodidae, *Dolichopus beschovskii* spec.nov., Pirin Mountain, Bulgaria.

INTRODUCTION

In recent papers of V. Beschovski and B. Dzhambazov (2002) and M. Kechev (2005) the species *Dolichopus albipalpus* Negrobov, 1973 was noted for the fauna of Bulgaria, and described by O. P. Negrobov from Mongolia (Negrobov, 1973). With additional studying, the species is specified as a new one. The material was collected by doctor V. Beshovski in 1982 from Pirin Mountain.

DESCRIPTION

Dolichopus beschovskii Negrobov & Kechev, spec. nov. (Figs. 1-3).

Diagnosis

Face silvery-white, antenna black, postocular bristles in ventral part of head light yellow, legs black, fore tibia without apicoventral bristles, hind femur without long ventral bristles, the thickening on costal vein is absent.

Male

Length body 3.7 mm, length wing 3.6 mm.

Head: Face silvery-white, its width in the middle is approximately equal to width of first flagellomere. Proboscis and palpus dark-brown with brown hairs. Fronts shining green with grey pollen along the edges. Antenna black. First flagellomere reniform.

Its length approximately 1.5 times more than width. Arista located in average part of first flagellomere, with very short hairs. Length ratio of first flagellomere, its width and lengths of arista: 1.3: 1.8: 4.1. Postocular bristles in ventral part of head light yellow, on top part of head there are some expanded.

Thorax: Green with bronze shade. Mesonotum shining metallic, pleuron in grey pollen. Propleuron with black bristles and hairs. 6 strong dorsocentral bristles. Acrostichal bristles well developed. Scutellum on edge with black 2 strong, 2 small bristles and with small hairs.

Legs: Black, with brown knees, pulvilli white. Coxae with black bristles. Fore femora without strong bristles and long hairs. Fore tibia without apicoventral bristles, with 1 anterodorsal, 1 dorsal and 1 posteroventral bristles. Tarsomere of fore and mid legs not expanded. Length ratio of fore tibia to fore tarsi (from 1 to 5): 7.5: 3.8: 1.9: 1.2: 1.3: 1.2. Mid femora with 1 strong preapical bristle. Mid tibia with 5 anterodorsal, 1 posterodorsal and 1 posteroventral bristles. Length ratio of mid tibia to mid tarsi (from 1 to 5): 9.9: 4.8: 4.5: 3.0: 1.8: 1.4. Hind femur with long white ventral bristles, with 1 strong preapical bristle. Hind tibia with strong 4 anterodorsal 4 posterodorsal bristles, 1 anteroventral bristle and short ventral bristles. 1st tarsomere of hind legs with 2 strong dorsal, 1- 2 anterodorsal bristles and 2-3 short ventral bristles. Length ratio of hind tibia to hind tarsi (from 1 to 5): 12.5: 4.7: 3.0: 2.2: 1.3: 1.2.

Wings: Transparent. The thickening on costal vein is absent. R_{4+5} and M_{1+2} at top parallel. M_{1+2} in a apical part hardly bent. Length ratio of costal vein between R_{2+3} and R_{4+5} and pf of the same vein and between R_{4+5} and M_{1+2} - 1.7 : 0.9. Ratio of apical part of M_{3+4} and tp - 2.6: 1.1. Squamae yellow with black hairs. Halter yellow.

Abdomen: Green shining with a bronze strips along the edges of segments and with black bristles. Hypopygium big, length of epandrium approximately 1.7 longer than wide. Cerci longer than wide, with finger-like marginal denticles.

Female unknown

Material examined: Holotype: 1 ♂. Pirin Mountain, Okoto Lake, 2200m, 8.08.1982, leg. Beschovski.

Paratype: 21 ♂♂. Pirin Mountain, Okoto Lake, 2200m, 8.08.1982, leg. Beschovski.

Etymology: The new species is named after dipterologist Dr. V. Beschovski from Bulgaria.

The holotype and the paratype are preserved in department of Zoology, Plovdiv University; one paratype is preserved in Department of Ecology and Systematics of Invertebrate Animals of Voronezh State University.

According to the key by O. P. Negrobov, etc. (2005) and A. A. Stackelberg (1930) the new species is close to *Dolichopus socer* Loew, 1871, described from Ochotsk (Khabarovsk territory, Siberia, Russia).

Hind femora with long ventral bristles

- Legs black. Wings at R_1 without enlargement
..... *Dolichopus beschovskii* Negrobov & Kechev, spec.nov.

- Fore and mid legs, the bases of fore and mid tarsus, 2/3 basal parts of hind tibia yellow. Wings at R_1 with enlargement.....*Dolichopus socer* Loew

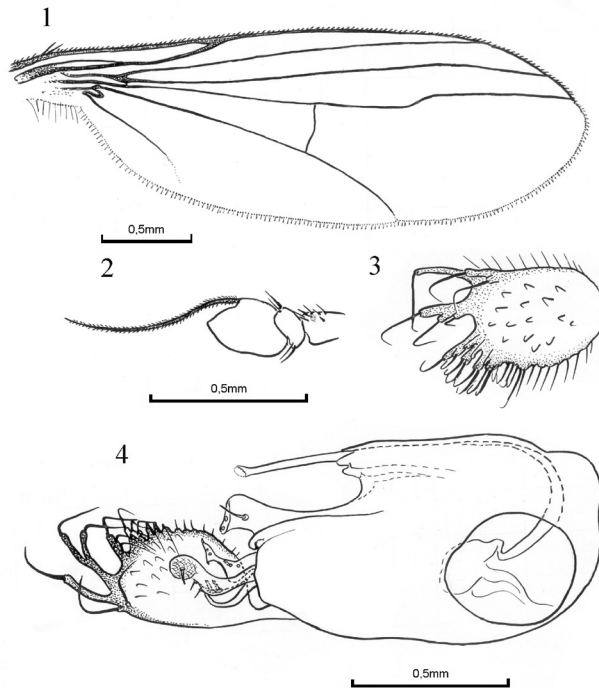


Fig. 1-4. *Dolichopus beschovski*, spec. nov. 1. wing, 2. antenna, 3. cerci, 4. hypopygium. Scale bar = 0,5 mm.

ACKNOWLEDGEMENTS

We would like to thank Dr. V. Beschovski and Dr. B. Dzhambazov for giving at our disposal for the purposes of this study the specimens, collected by them in Pirin Mountain. This research was partly funded by a research grant to Oleg P. Negrobov (Russian Foundation for Basic Researches, No 08-04-01623).

REFERENCES

- Beschovski, V., Dzhambazov, B., 2002, Dolichopodidae Taxa Known and New to the Bulgarian Fauna (Diptera: Empidoidea). *Acta Zoologica Bulgarica*, 54(1): 19-26.
- Kechev, M., 2005, Check-list of Dolichopodidae (Diptera, Brachycera) species in Bulgaria. *Animalia*, 41: 47-62.
- Negrobov, O. P., 1973, Die Dolichopodidae-Arten (Diptera) aus der Mongolischen Volkrepublik. II. *Acta Zoologica Academiae*, 19(1-2): 133-153. (Scient. Hung).
- Negrobov, O. P., Rodionova S. Y., Maslova O. O., Selivanova O. O., 2005, Key to the males of the Palaearctic species of the genus *Dolichopus* Latr. (Diptera, Dolichopodidae). *International Journal of Dipterological Research*, 16(2): 133-146.
- Stackelberg, A. A., 1930, *Dolichopodidae*. Die Fliegen der Palearktischen Region. Lief, 51: 1-64.